17. The detector system as recited in claim 1, further comprising:

means for moving the sonic beam to scan its focal point over a region in the object to be imaged, wherein said detector receives said sonic wave produced at the modulating frequency by the object as said sonic wave is scanned and said detector produces an output signal indicative of the amplitude of the sonic wave; and

a display for receiving the output signal and producing an image indicative of the amplitude of the sonic wave emanating from locations in said region.

18. The detector system as recited in claim 17 in which the object is located within a human subject and the detector system is located outside the human subject.

19. The detector system as recited in claim 17 in which the modulating frequency is changed over a range of values as the focal point scans the region to be imaged, and the detector receives the sonic waves produced at the corresponding frequencies.